Abstract

The invention relates to a clamping and/or braking device with a base element (7) and a force-applying element (17), by means of which the generated clamping and/or braking forces can be transferred to an object (39), as well as at least two adjacent wall sections (3), which each apply force with an end region on the base element (7) and the force-applying element (17), and wherein the two or more adjacent wall sections (3) define an essentially sealed pressure chamber that can be pressurized with pressure or negative pressure, wherein the two or more wall sections (3) each have a bending region (3a), which is resistant to tensile force and nevertheless can be bent elastically so that the bending regions (3a) form an elastic element between the base element (7) and the force-applying element (17).

By means of the force-applying element (17), in the unpressurized built-in state of the clamping and/or braking device (1), a predetermined clamping and/or braking force can be exerted on the object (39), wherein the two or more wall sections (3) and their bending regions (3a) are formed, such that when the pressure chamber is pressurized with positive pressure or negative pressure as a result of a change in the curvature of the bending regions (3a), the clamping and/or braking forces transferred by the force-applying element (17) to the object (39) are changed or the force-applying element (17) is moved in the direction towards the base element (7) or away from this element.

According to one alternative, the two or more adjacent wall sections (3) can also be connected rigidly to the force-applying element (17) and/or to the base element (7).

Main drawing is Figure 8a